

REMARKS

The foregoing amendments and the following remarks are submitted in response to the communication dated January 9, 2008.

***Status of the Claims***

Claims 12-19 were pending in the present application. By virtue of this response, each of claims 12, 13, 14, 15, 16, 17, 18, and 19 have been amended, and new claim 22 has been added. Accordingly, claims 12-19 and 22 are currently presented and under consideration as amended. Support for the claim amendments can be found generally throughout the specification. In particular, support for new claim 22 and the phrase “administered intraperitoneally, intramuscularly, subcutaneously, orally or nasally” can be found in the specification, including at paragraph [114], page 34, of the published PCT Application. Support for the unit of measurement of molecular weight, “Da”, or daltons, in each of claims 12, 13, 15, 17 and 18 can be found in the specification, including at paragraph [033], page 11, of the published PCT Application.

With respect to all amendments and canceled claims, Applicant has not dedicated or abandoned any unclaimed subject matter and, moreover, has not acquiesced to any rejections and/or objections made by the Patent Office. Applicant reserves the right to pursue prosecution of any presently excluded claim embodiments in future related applications.

***Claim Objections***

Claim 14 is objected to as ending with two periods instead of one. Claim 14 has been above amended, including to remove the extra period. Applicants respectfully request this objection be withdrawn.

***New Rejections***

***Claim Rejections – 35 USC §112, Second Paragraph***

Claim 18 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for

failing to particularly point out and distinctly claim the subject matter which Applicant regards as the invention. Claim 18 is rejected as reciting “**the** apoptogenic-bacteriocin capable of inducing apoptosis”. Applicants have above amended claim 18 to recite “**an** apoptogenic-bacteriocin capable of inducing apoptosis”.

Claims 12, 13, 15, 17 and 18 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite in reciting “molecular weight less than 10,000” without reciting a unit of measurement for the molecular weight. Applicants have above amended each of claims 12, 13, 15, 17 and 18 to recite “molecular weight less than 10,000 Da”. The term “Da”, which refers to daltons, is a clear, well-recognized, and art accepted measurement for molecular weight.

In view of the above remarks and amendments, Applicants request the Examiner withdraw the above new rejections under 35 U.S.C. 112, second paragraph.

***Claim Rejections – 35 USC § 112, First Paragraph***

The Examiner rejects claims 14-19 under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement, the Examiner asserting that the claims contain subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the art that the inventor(s), at the time the application was filed, had possession of the claimed invention. The Examiner remarks that the specification does not provide adequate written description and evidence of the broad genus of fragments or analogs encompassed in the claims. Applicants respectfully disagree and again assert that the specification sets out and describes specific and particular characteristics and capabilities of the apoptogenic-bacteriocin, particularly E492, suitable for and of use in the claimed methods. These provide tests for determining the capability and suitability of an active fragment or analog of microcin E492 or of SEQ ID NO:2 in the claimed methods. Applicants have above amended the claims, without acquiescing to the Examiner and without any prejudice to further or future prosecution. Applicants respectfully submit that claims 14-19, particularly as above set out and amended, are fully and appropriately described by the instant disclosure.

***Maintained Rejections***

***Claim Rejections – 35 USC §112***

Claims 12-16 and 19 remain rejected and claims 17 and 18 are rejected under 35 U.S.C. 112, first paragraph, because the specification, while being enabling for a method of apoptosis of tumor cell or cancer cells in a mammal, the treatment of cancer in a mammal, and reducing cancer growth in a mammal, comprising administering to said mammal an effective amount of the apoptogenic-bacteriocin of claim 1 or comprising the amino acid sequence of SEQ ID NO: 2, does not reasonably provide enablement for a method for reducing any eukaryotic cell growth or blocking eukaryotic growth, comprising administering to said mammal an effective amount of the claimed apoptogenic-bacteriocins. The Examiner further asserts that the specification does not reasonably provide enablement for a method for apoptosis of tumor cells or cancer cells, reducing eukaryotic growth, or treating cancer in a mammal comprising administering any active fragments or analogs of a microcin E492 or SEQ ID NO: 2. Applicants respectfully disagree. Applicants again assert that the specification, particularly in view of the significant skill of the skilled artisan, fully enables the making, testing and use of active fragments and analogs of microcin E492 and of SEQ ID NO: 2 in the claimed methods. The specification sets out and describes specific and particular characteristics and capabilities of the apoptogenic-bacteriocin, particularly E492 and/or SEQ ID NO: 2 and active fragments or analogs thereof, suitable for and of use in the claimed methods. These provide tests for determining the capability and suitability of an active fragment or analog of microcin E492 or of SEQ ID NO: 2 in the claimed methods. Applicants have above amended the claims, without acquiescing to the Examiner and without any prejudice to further or future prosecution. Applicants point out that claims 15 and 16 as amended above, without prejudice, are more particularly directed to reducing cancer growth. Applicants respectfully submit that claims 12-16, 17, 18 and 19, particularly as above set out and amended, are fully enabled by the instant disclosure.

In view of the foregoing remarks and above amendments, Applicants submit that the Examiner's rejections under 35 U.S.C. 112, first paragraph, may properly be withdrawn.

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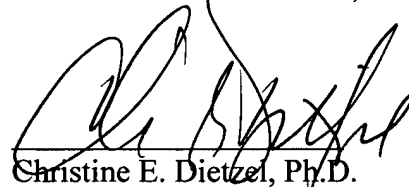
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CONCLUSION

Applicants respectfully request entry of the foregoing amendments and remarks in the file history of the instant Application. The Claims as amended are believed to be in condition for allowance, and reconsideration and withdrawal of all of the outstanding rejections is therefore believed in order. Early and favorable action on the claims is earnestly solicited.

Respectfully submitted,

KLAUBER & JACKSON, LLC

A handwritten signature in black ink, appearing to read 'Christine E. Dietzel', is written over a horizontal line.

Christine E. Dietzel, Ph.D.  
Agent for Applicant(s)  
Registration No. 37,309

KLAUBER & JACKSON, LLC  
411 Hackensack Avenue  
Hackensack NJ 07601  
Tel: (201) 487-5800